

## Abstract

An automated design for manufacturability platform which provides integrated physical verification and manufacturing enhancement operations. The platform uses an efficient data structure capable of handling and manipulating both layout circuit and geometry characteristics, which permits a wide range of operations such as timing analysis, design-rule checking and optical proximity corrections on a single platform. This feature eliminates the need to translate layout representations between various tools without the requirement of using a common database. Moreover, the platform's common user interface enables encapsulated information exchange between the design and the manufacturing teams, permitting early consideration of manufacturing distortion or enhancement impact on circuit performance.

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